

<b>Examiner-Initiated Interview Summary</b>	<b>Application No.</b> 09/751,756	<b>Applicant(s)</b> MARSHALL ET AL.	
	<b>Examiner</b> Alexander Jamal	<b>Art Unit</b> 2614	

**All Participants:**

(1) Alexander Jamal.

(2) Juliet Dirba.

**Status of Application:** under appeal

(3) \_\_\_\_\_.

(4) \_\_\_\_\_.

**Date of Interview:** 29 March 2007

**Time:** 11:30am

**Type of Interview:**

- ☒ Telephonic  
☐ Video Conference  
☐ Personal (Copy given to: ☐ Applicant ☐ Applicant's representative)

Exhibit Shown or Demonstrated: ☐ Yes ☐ No

If Yes, provide a brief description:

**Part I.**

Rejection(s) discussed:

*all*

Claims discussed:

*all*

Prior art documents discussed:

*See Continuation Sheet*

**Part II.**

SUBSTANCE OF INTERVIEW DESCRIBING THE GENERAL NATURE OF WHAT WAS DISCUSSED:

**Part III.**

- ☒ It is not necessary for applicant to provide a separate record of the substance of the interview, since the interview directly resulted in the allowance of the application. The examiner will provide a written summary of the substance of the interview in the Notice of Allowability.  
☐ It is not necessary for applicant to provide a separate record of the substance of the interview, since the interview did not result in resolution of all issues. A brief summary by the examiner appears in Part II above.

  
(Examiner/SPE Signature)

\_\_\_\_\_  
(Applicant/Applicant's Representative Signature – if appropriate)

Continuation of Identification of prior art discussed: The examiner noted new art and rejection to be used in the appeal case. Examiner submits a pto-892 form with the new references and a copy of an email sent to applicant's representative Juliet Dirba explaining the use of the references in the rejection. The examiner notified Mrs. Dirba of a claim amendment that would read over the prior art of record. Examiner received a prosal set of claims over email and is now entering an examiner's amendment and allowance for the claims. A portion of the email explaining the new references of record is included:

-Previous art that is being maintained:

Erreygers (6236664): this is the primary reference that teaches an ADSL repeater. He does not go into detail on the specific functions of the ADSL transceivers but he does disclose 2 adsl transceivers used, back to back in Fig. 3. He further specifies that the transceivers function to remodulate the adsl signal and that the transceivers may be well known ADSL chipsets such as the motorola coppergold adsl chipset (Col 5 lines 34-50). My argument is that one of obvious skill would know that a repeater may regenerate or amplify a signal and that Erreygers already contemplates that because he discloses using two full adsl transceiver chipsets, back to back in order to remodulate the signal. If it is remodulated that means it must first be demodulated and it would have been obvious to recover the data (that is requantizing the data).

-New art: these documents are being brought in to teach the specific functions performed by conventional adsl transceivers, noting that Erreygers already discloses using two transceivers back to back in a repeater

I submitted a [www.whatis.com](http://www.whatis.com) definition for 'DMT' or 'discrete multitone' it is a known signalling protocol that divides the spectrum into frequency bands..this was one of your arguments in the brief. Erreygers discloses a DMT system ( <http://www.chipweb.de/dsl/index.php?menu=1&id2=56> ) for the coppergold chipset.

Shively (6418161) teaches a DMT modulation transceiver (Col 1 lines 50-60)... the same DMT-type as used in Erreygers that recovers the data by performing the appropriate fft/iff, demodulation, and also requantization (Col 10 lines 30-62). These are most of the steps that are in your independant claims. Assuming it would have been obvious for a repeater to regenerate the signals, and noting that Erreygers already discloses two ADSL transceivers back to back, that will cover all the parts of the independant claims except for the 'amplifying' step at the end. for that I bring in:

Cheng (6674810): to teach that DMT ADSL transceivers require amplification in order to drive the signals out to a subscriber line (Col 5 lines 20-45). There are probably many references I could use for a generic 'amplification stage' to drive a DSL signal out to a subscriber loop, that certainly is not new. I am also in the process of trying to get complete datasheets for the coppergold chipset referenced in Erreygers as that will also show amplifiers to drive the signals onto the loop.

You disqualified the McGhee reference in the appeal brief. I am going to read the highpass and lowpass filters of Erreygers as a 'splitter'/combiner for any of the splitters referenced in the claimset.

-Not part of the rejection, but submitted in support of my obvious rejection that it is well known that repeaters can amplify or regenerate signals, I have the following patent references:

Schneider (6625116): Col 4 line 64 to Col 5 line 6

White (6731678): Col 2 line 65 to Col 3 line 5

Levonas (6879625): Col 2 lines 8-35

Sommer (7142619): Col 14 lines 49-60

Namiki (4701935): Col 1 lines 15-30

(there were many others as well I just picked out 5... I did a search for 'repeater' and 'regeneration' )

I believe that if you could put the claim element of combining the regenerated adsl signal with the voice signal and then amplifying the combined signal into each existing independant claim, then we could push for allowance.

hopefully that helps explain where I'm at as far as a rejection. I look forward to discussing this with you further !!!

thank you for your time , .